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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/519,156	12/17/2004	Kathleen Kurschner	3075-005	6599

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KILYK & BOWERSOX, P.L.L.C.  
400 HOLIDAY COURT  
SUITE 102  
WARRENTON, VA 20186

EXAMINER

CHAWLA, JYOTI

ART UNIT PAPER NUMBER

1761

DATE MAILED: 12/13/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

## Office Action Summary

Application No.

10/519,156

Applicant(s)

KURSCHNER ET AL

Examiner

Jyoti Chawla

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☒ Responsive to communication(s) filed on 30 June 2006.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1-11 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-11 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☒ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
  - ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- |                                                                                      |                                                                   |
|--------------------------------------------------------------------------------------|-------------------------------------------------------------------|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)          | 4) <input type="checkbox"/> Interview Summary (PTO-413)           |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____                                      |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)          | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____                                                          | 6) <input type="checkbox"/> Other: _____                          |

### **DETAILED ACTION**

Amendment to claims and specification filed June 30, 2006 have been entered. Claim 11 has been added. Claims 1-11 are pending and are examined in the application.

#### ***Claim Objections***

Claim objections identified in the office action Mailed March 9, 2006 have been withdrawn in light of applicant's remarks and clarification.

#### ***Claim Rejections - 35 USC § 102***

The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.

(1) Claims 1-5, 7, 9-11 are rejected under 35 U.S.C. 102(b) as being anticipated by Matsunaga (U.S. 3901983).

The references and rejection are incorporated herein and as cited in the office action mailed March 9, 2006.

Regarding the newly added claim 11, the reference does teach dry peanut extract as recited in the claims 2, 3, 10 and 11(Column 3, lines 31-52). Matsunaga discloses that the peanut flour obtained can be added to products such as water-based drinks and milk to enhance their nutritive value and impart flavor (Column 3, lines 1-7). Since peanuts have pale white to medium brownish color (before or after roasting) and powders of peanuts give milky or opaque solutions, it is inherent that the addition of the peanut based powder would impart a pale milky to brownish color to the food or water as recited in claims 5 and 7 and as stated in the previous office action. Also see (Column 4, lines 19-21).

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Matsunaga teaches the process of making the powder from peanuts, and although the reference does not specifically state the number of steps in the entire process, however the peanuts are parched, shelled, soaked, parched again and then slurried and dried to make the free flowing powder that can be added to foods. Thus the process of extraction or production the peanut product is carried out in stages as recited by the applicant in claim 4.

Regarding claim 9, this is a product-by-process limitation. Matsunaga discloses that the peanut flour obtained can be added to various drinks such as milk and water-based drinks to form highly concentrated foods (Column 3, lines 1-5).

"Even though product-by-process claims are limited by and defined by the process, determination of patentability is based on the product itself. The patentability of a product does not depend on its method of production. If the product in the product-by-process claim is the same as or obvious from a product of the prior art, the claim is unpatentable even though the prior product was made by a different process." In re Thorpe, 777 F.2d 695, 698, 227 USPQ 964, 966 (Fed. Cir. 1985)

(2) Claims 1-5, 7-10 are rejected under 35 U.S.C. 102(e) as being anticipated by Khatchatrian et al (WO 01/53418).

The references and rejection are incorporated herein and as cited in the office action mailed March 9, 2006.

Regarding claim 1, Khatchatrian et al, hereinafter Khatchatrian, discloses a dry extract obtained from dried walnut rinds (Page 2, lines 18-20), in addition Khatchatrian discloses that any method of drying known in the art may be employed, such as, heated gas stream (Page 3 lines 24-26). Note: American heritage dictionary defines roasting

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as "To dry, brown, or parch by exposing to heat"; therefore, drying as taught by

Khatchatrian incorporates roasting, because it is a form of dry heating.

Regarding claims 2 and 10, Khatchatrian teaches walnut, which is a hard-shelled fruit or nut.

Regarding claim 3, Khatchatrian teaches subjecting the grounded walnut rinds to a water extraction. The liquid extract is exposed to spray drying to produce a powder product (page 2 lines 17-19, page 3 lines 1-3).

Regarding claim 4, Khatchatrian teaches carrying out the extraction in stages (page 3 lines 31-32).

Regarding claims 5 and 7, Khatchatrian teaches that the resulting powder obtained may be used as a dye for foodstuffs, cosmetics and hair color products (page 4 lines 26-29).

Regarding claim 8, Khatchatrian is silent as to applying the dry extract to form a film.

However, Khatchatrian discloses that the dye material produced may be used to color confectionery products such as cakes or ice creams. It is inherent that the dye application forms a coating or film on the product by coloring it.

Regarding claim 9, this is a product-by-process limitation. Khatchatrian teaches that the resulting powder obtained may be used as a dye for foodstuffs.

"Even though product-by-process claims are limited by and defined by the process, determination of patentability is based on the product itself. The patentability of a product does not depend on its method of production. If the product in the product-by-process claim is the same as or obvious from a product of the prior art, the claim is unpatentable even though the prior product was made by a different process." In re Thorpe, 777 F.2d 695, 698, 227 USPQ 964, 966 (Fed. Cir. 1985).

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(3) Claims 1-5, 9-11 are rejected under 35 U.S.C. 102(b) as being anticipated by Robinowitz et al (US 5160756).

Robinowitz et al, hereinafter Robinowitz teaches extraction of products from Almond fruit, specifically almond hulls utilizing multi-step/ multi-stage process (Abstract, figure 1, Column 1, lines 20-25, and 64-68) as recited by the applicant in claims 1, 2, 4, 10 and 11. Robinowitz also teaches that the almond hulls (nut by-product) are used for animal feed, i.e., food (Column 2, lines 1-4) and dietary fiber and sweetener fit for human consumption (Column 2, lines 27-39 and Column 3) as recited in claim 9. The reference further teaches coloring components (tannins) can be extracted from the almond hull can be dried (Column 2, lines 24-28) as recited in claims 3 and 5. The tannins, fibers and sweeteners, are all by-products of almond hulls and can be obtained from almond hulls by a multi-step process as taught by Robinowitz. Therefore, Robinowitz anticipates applicant's claims 1-5 and 9-11.

***Claim Rejections - 35 USC § 103***

The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.

(A) Claim 6 is rejected under 35 U.S.C. 103(a) as being unpatentable over Khatchatrian et al in view of Fox (US 6132791).

The references and rejection as cited in the office action mailed March 9, 2006 have been withdrawn in light of applicant's arguments.

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(B) Claims 6-8 are rejected under 35 U.S.C. 103(a) as being unpatentable over Robinowitz in view of Nafisi-Movaghar et al. (US 5912363).

Robinowitz has been applied to claims 1-5 and 9-11 above.

Robinowitz teaches extraction of tannins (coloring material), dietary fiber (food) and sweetener (food) from almond hulls (by-products of nuts). Robinowitz however does not specifically teach a method of coloring a product comprised by the addition of any of the above by-products. Nafisi-Movaghar et al, hereinafter Nafisi, teaches extraction of proanthocyanidins, i.e., the stable compounds that upon hydrolysis form anthocyanins or reddish color pigment in fruits, flowers etc., (Column 1, lines 5-60) from grape seed, almond hull or walnut hull (Column 10, lines 1-5 and Column 3, lines 27-38). Therefore Nafisi teaches a dry extract from almond or walnut hull that can stabilize anthocyanins as recited in claim 6. The extract taught by Nafisi is obtained and concentrated and dried as recited in claim 1 (Column 4, lines 10-55). Proanthocyanidins or Oligomeric proanthocyanidins or OPC's are well known for their antioxidant properties (Column 2, lines 28-68) and the hydrolyzed product anthocyanin is a known food color (Column 10, lines 30-35). Thus Nafisi teaches a dry extract of a nut by-product that can be used in coloring a food product as recited in claims 5 and 7.

Dry extracts of by- products of nuts have been known in the art (Robinowitz and Nafisi). It has also been known that proanthocyanidins are stable precursors of anthocyanins and anthocyanins are a known source of natural food color (Nafisi). Therefore it would have been obvious to one of ordinary skill in the art to modify the method taught by Robinowitz and heat the aqueous solution of almond hulls to extract edible

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anthocyanins from almond hulls, based on the method taught by Nafisi. One would have been motivated to do so to produce a potent antioxidant, anticancer component and a colorant (after hydrolysis) from the by-product of nuts such as almonds.

Regarding claim 8, both Rabinowitz and Nafisi teach dried extracts of color producing compounds obtained from the by-products of nuts. It is an inherent property of a coloring matter to provide color to the substrate it is applied to. Thus both Robinowitz and Nafisi teach the invention as claimed in claim 8.

(C) Claims 1-2, 10 and 11 are rejected under 35 U.S.C. 103(a) as being unpatentable over Ivie (US 5219818) in view of Matsunaga (U.S. 3901983).

Ivie teaches the method of processing peanut hulls, i.e., nut by-products as recited by the applicant in claims 1,2, 10 and 11(Abstract and Column 1). The reference does not specifically teach the roasted nut by-product, however Ivie reference has peanut hulls as the starting material, however Matsunaga teaches the dry peanut product where the peanuts are parched, i.e., dry heated or roasted as recited in claim 1. Matsunaga further teaches that fresh peanuts are heat treated to separate the nut from the shell and/or skin and/or membrane. Thus, heating and drying (roasting) and curing of peanuts with or without the shells have been known in the art. Therefore it would have been obvious to one of ordinary skill in the art to modify Ivie and specify roasting or parching the peanuts in the shell before separating the edible part commonly known as nut from the rest. One would have been motivated to do so to reach the desired degree of moisture level in the harvested peanut in a hygienic and fast manner, which would further ease the shelling process of the peanuts.



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(D) Claims 1-5, 9-11 are rejected under 35 U.S.C. 103(a) as being unpatentable over Ivie (US 5219818) and Matsunaga further in view of Lenoble et al. (US 5908650).

Ivie and Matsunaga have been applied to claims 1, 2, 10 and 11 above.

Ivie and Matsunaga teach that the peanut hull is processed in stages to make a dry granulated cellulosic material that is capable of absorbing moisture (Abstract and Column 1, lines 20-50) as recited in claims 3, 4 and 9. The reference teaches processing peanut hull by pulverizing the hulls as by milling the peanut hulls and the fine powdered hulls are dried and compacted to make very fine dry powder product, which can be granulated with high density to increase the moisture absorption capacity of the product (Column 1, line 65, Column 2, line 12-36).

Although the reference is silent as to the method of coloring a product comprising the addition of the peanut hull composition as recited in claim 5 but the reference teaches that peanut hull has been known for its use as cattle feed roughage, i.e., food (Column 1, lines 30-35, Columns 2 and 3) as recited in claim 7. However, since the peanut hull inherently has pale white to brown color (based on cultivar and the method of processing the whole nut), thus peanut hull powder would lend color to any composition that it is added to, e.g., animal feed or absorbent composition, as recited in claim 5.

Ivie reference does not teach that the peanut hull stabilizing the product containing anthocyanins or anthocyanidins and also does not teach that a composition comprising the dry extract of peanut hull would form a film on a substrate. However, Lenoble et al, hereinafter Lenoble teaches Lenoble teaches that water extracts of peanut hulls act as

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co pigments and also as pigment stabilizing agents for the foods containing anthocyanin pigments, such as grape, elderberry, hibiscus and red cabbage (Column 10, line 60 to Column 13, line 52). Since anthocyanins have been known in the art as red, red brown and blueish red food pigments obtained from vegetable or plant matter, such as grape, elderberry etc., and since peanut hull extract has been known to enhance and stabilize the anthocyanin pigment (Lenoble, Table VIII), therefore, it would have been obvious to one of ordinary skill in the art that the dry hull extract of peanuts as taught by Ivie would have the anthocyanidin stabilizing property as well. It would also be obvious to one of ordinary skill in the art that the moisture absorbing fine dry extract taught by Ivie would also form a film when used as part of a composition to form a film on a substrate.

### ***Response to Arguments***

- I) Applicant's arguments, see remarks, pages 4-5, filed June 6, 2006, with respect to claim objections have been fully considered and are persuasive. The claim objections about the claim numbers have been withdrawn.
- II) Applicant's arguments filed June 30, 2006, regarding the 102(b) rejection over Matsunaga have been fully considered but they are not persuasive. In response to the argument that Matsunaga does not teach roasted product, the applicant is referred to the office action dated March 9, 2006. Regarding claim 1, Matsunaga discloses a dry extract obtained from dry heated peanuts (Column 2 lines 16-20, Column 3 line 52), where the reference teaches parching the shelled peanuts. Parching is defined as "to

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dry or roast by exposing to heat" by American Heritage Dictionary", therefore the reference does teach roasting of peanuts.

III) The Affidavit or declaration filed on June 30, 2006 under 37 CFR 1.131 has been considered but is not persuasive as it has only been signed by one inventor and the application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).

Therefore the Affidavit filed on June 30, 2006 under 37 CFR 1.131 has been considered but is ineffective to overcome the Khatchatrian reference.

### ***Conclusion***

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. Prior art discloses applicable subject matter.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jyoti Chawla whose telephone number is (571) 272-8212. The examiner can normally be reached on 8:00 am to 4:30 pm.

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If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Milton Cano can be reached on (571) 272-1398. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Jyoti Chawla  
Examiner  
Art Unit 1761



**KEITH HENDRICKS**  
**PRIMARY EXAMINER**